ABSTRACT

A water quenched magnesium/aluminum die casting alloy, includes Al between 2.8 and 3% by weight; Si between 0.7, and 1.5 % by weight; Mn greater than 0.20 % by weight; Zn less than 0.20 % by weight; Cu less than 100 ppm; Ni less than 20 ppm; and Fe less than 50 ppm. in addition, a method for manufacturing the magnesium/aluminum die casting alloy wherein the water quenching takes place within a predetermined time period after casting or after the die casting mold is opened.